DOCUMENT RESUME

ED 293 391 HE 021 057

AUTHOR Baum, Sandy; Schwartz, Saul
TITLE The Impact of Student Loans on Borrowers: Consumption Patterns and Attitudes towards Repayment. Evidence from the New England Student Loan Survey.
INSTITUTION Massachusetts Higher Education Assistance Corp., Boston.; New England Education Loan Marketing Corp.
PUB DATE Jan 88
NOTE 23p.
PUB TYPE Statistical Data (110) -- Reports - Descriptive (141)

EDRS PRICE MF01/PC01 Plus Postage.
DESCRIPTORS Academic Persistence; *Access to Education; College Attendance; *College Choice; College Graduates; *College Students; Higher Education; *Loan Repayment; *Student Attitudes; *Student Loan Programs
IDENTIFIERS *Debt (Financial); Mail Surveys

ABSTRACT

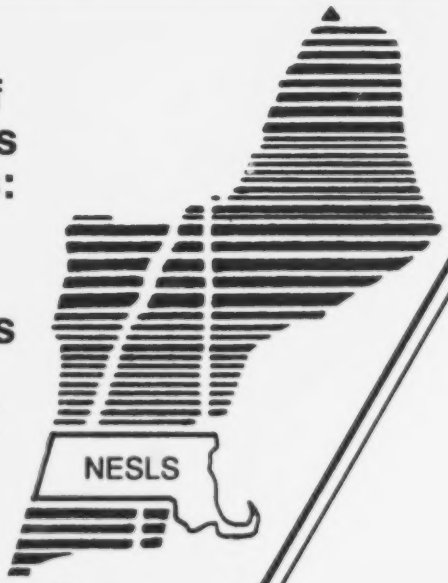
The extent to which educational debt is burdensome for borrowers who are currently in repayment was studied with attention to the actual impact of loan repayment on economic behavior and the perceptions of repayers concerning that impact. Opinions of borrowers concerning the role of student loans in providing access to and choice among higher education institutions were also considered. The data came from a mail survey of a random sample of 2,000 borrowers who were currently paying off their student loans. A 70% response rate was achieved. All recipients borrowed from the Guaranteed Student Loan Program, and one-third also borrowed from the National Direct Student Loan program. It was found that the number of borrowers owing more than $10,000 and paying $150 a month or more was rising, but these students were earning more money because of their education. Two-thirds of respondents said the availability of loans was very or extremely important in allowing them to continue their education after high school. About 55% said the loans were crucial in allowing them to enroll in the particular institution they attended. A similar majority of borrowers felt that the availability of loans allowed them to stay in school to complete their degrees. 22 references. (SW)

****
* Reproductions supplied by EDRS are the best that can be made *
* from the original document. *
****

ED293391

The Impact of Student Loans on Borrowers:

Consumption Patterns and Attitudes Towards Repayment



Evidence from the New England Student Loan Survey

Sandy Baum
Skidmore College

Saul Schwartz
Tufts University

January, 1988

U.S. DEPARTMENT OF EDUCATION
Office of Educational Research and Improvement
EDUCATIONAL RESOURCES INFORMATION CENTER (ERIC)

☑ This document has been reproduced as received from the person or organization originating it.

☐ Minor changes have been made to improve reproduction quality.

• Points of view or opinions stated in this document do not necessarily represent official OERI position or policy.

"PERMISSION TO REPRODUCE THIS MATERIAL HAS BEEN GRANTED BY

Massachuetts Higher Education Assistance Corporation

TO THE EDUCATIONAL RESOURCES INFORMATION CENTER (ERIC)."

HE 021 057

The Impact of Student Loans on Borrowers:

Consumption Patterns and Attitudes Towards Repayment

Evidence from the New England Student Loan Survey

Sandy Baum
Skidmore College

Saul Schwartz
Tufts University

January, 1988

Preface

The New England Student Loan Survey, a study of 2,000 borrowers under the Guaranteed Student Loan Program was a joint project of two education loan organizations. Board members of the New England Education Loan Marketing Corporation requested this research on student borrowing. The Massachusetts Higher Education Assistance Corporation (MHEAC) co-sponsored the study because so many of the students either lived in or studied in Massachusetts. The initial questions were very fundamental:

- Do borrowers feel the benefits of loans outweigh the costs?
- Does debt prevent continuing on with advanced study?
- Does debt affect career choice or actual spending patterns?
- Does debt prevent borrowers from purchasing an automobile?

Earlier in the 1980s the National Association of School Financial Aid Administrators (NASFAA) surveyed students and asked similar questions about debt burden. Since that time, indebtedness levels have risen. The present study updates the NASFAA study and reflects a borrower response rate of over seventy percent.

We have read the results of the NESLS with great interest and find it impressive that fully half of the former students repaying their loans feel little or no burden. Moreover, nearly seventy percent of borrowers believe that the educational benefits are worth the monthly payments they now make. We were not surprised that 30 percent feel loan payments are a burden. We are intrigued by their actual economic behavior: eighty-five percent of the borrowers own an automobile, and half of these are brand new vehicles.

Studies like NESLS are important in helping to evaluate policies for student loan programs. We recommend that other states conduct their own studies to assess borrower perceptions and economic behavior. These studies

should occur regularly at appropriate intervals to maintain timely information about consumer reaction to the student loan program.

We should also improve our knowledge of this significant national program by broadening our inquiries using data from states with populations containing more minority students and greater proportions of public institutions, and with study designs that include defaulters and students who did not borrow at all. So too, there is value in narrowing the research focus to understand more about the group who feels heavily burdened by student debt (in the NESLS case 30 percent). We would like to know about these borrowers -- the level of debt they have accumulated; the kinds of jobs they have; the courses of study they pursued; their level of satisfaction about the schooling they received; and the extent to which their perception of burden is related to factors other than actual economic burden. Answers to these and other questions can help MHEAC, Nellie Mae and the Congress find new options for reducing burden, both perceived and real.

Since no educational assistance program is without flaw, it is important to know just how many student borrowers are quietly content compared to a vocal minority who complain of their indentured future. Sound public policy must be based on an accurate assessment of its impact on the "consumer" -- in this case, the student. We are confident the NESLS achieves this important objective.

Lawrence W. O'Toole
President
The New England Education
Loan Marketing Corporation

Joseph M. Cronin
President
Massachusetts Higher Education
Assistance Corporation

Introduction

The structure of financial aid to postsecondary students has been transformed over the last decade. In 1975, loans constituted only 17% of total aid and outright grants comprised almost all of the remainder. [1] By 1985, approximately 50% of total student aid was in the form of loans; average indebtedness for students completing four-year undergraduate programs was $6,700 in public schools and $9,000 in private schools.[2] Policymakers and members of the higher education community worry that the magnitude of this borrowing may either discourage students from attending the colleges of their choice or severely limit their future occupational and lifestyle options.

This study investigates the extent to which educational debt is burdensome for borrowers who are currently in repayment.[3] We assess both the actual impact of loan repayment on economic behavior and the perceptions of repayers concerning that impact. In addition, we review the opinions of borrowers concerning the role of student loans in providing access to and choice among higher education institutions.

The data on which the study is based come primarily from a mail survey sent to a random sample of 2,000 borrowers who are currently paying off their student loans.[4] This random sample was selected from a population whose loans were guaranteed by the Massachusetts Higher Education Assistance Corporation (MHEAC) and purchased in the secondary market by The New England Education Loan Marketing Corporation (Nellie Mae).[5]

All of the people in the sample borrowed through the Guaranteed Student Loan (GSL) program. One-third also borrowed from the National Direct Student Loan (NDSL) program. The average total amount of student loan debt which the respondents accumulated is about $7,300.[6] Over 40% of the respondents accumulated debts of more than $7,500, putting them in a category where they might be expected to experience repayment problems.[7] The average total monthly payment from all loans combined is $105 per month; 15% have payments of more than $150, and 24% pay the minumum $51 per month or less.[8]

Because of the very high response rate of 70% achieved in this study, we believe that our results are representative of the underlying population -- Massachusetts borrowers in repayment. But it should be noted that only 25% of postsecondary students borrow to finance their educations, so our results cannot be generalized to all postsecondary students. Nor do our conclusions apply to defaulters, who comprise about 10% of those who borrow. In addition, the borrower population in Massachusetts is unrepresentative of the corresponding U.S. population in several ways. A relatively small percentage (about 6%) of the overall Massachusetts population is black or Hispanic compared to the national proportion of 14%. Also, 57% of Massachusetts students attend private schools, versus 22% in the nation as a whole.[9]

Perceptions of the Role of Loans in Providing Access and Choice

The GSL program was designed to increase access and choice in higher education. We therefore discuss respondents' perceptions of the benefits they have received from the availability of student loans before turning to the burden or "cost" of the loans.[10]

When asked to rank the importance of the availability of student loans in allowing them to continue their education after high school, two-thirds of the respondents said loans were very important or extremely important (Table 1). Over half of the respondents perceive loans as crucial in having allowed them to go to the particular institution they actually attended. Loans are also viewed as important in allowing borrowers to stay in school. Of the 85% of the respondents who stayed in school to complete the last degree they began, 62% said the availability of loans was very important or extremely important in allowing them to do so. Of the 23% of the sample who attended graduate school, 55% think loans were crucial in allowing them this opportunity.

Table 1

Perceptions of the Importance of Student Loans In Increasing Access and Choice

The New England Student Loan Survey

How important was the availability of student loans in allowing you to:

	Not at all important	Somewhat important	Important	Very important	Extremely important
Continue your education after high school	7%	11%	16%	28%	39%
Go to the particular school you attended	11%	15%	18%	24%	31%
Stay in school to complete your degree [a]	9%	13%	15%	25%	37%
Go to graduate school [b]	24%	10%	11%	13%	42%

[a] Percentages are based on the 85% of respondents who completed their last degrees.
[b] Percentages are based on the 23% of respondents who went to graduate school.

Source: Computations by the authors from the New England Student Loan Survey

---

We can obtain additional insight by isolating the borrower characteristics which are correlated with these perceptions.[11] When we do this, we find that family income (at the time of last GSL application) is a statistically significant determinant of borrower perceptions.[12] Borrowers from low-income families believe that loans were more important in allowing them access and choice than borrowers from high-income families. Payment levels are not correlated with perceptions concerning access and choice.

Despite the general consensus about the importance of the availability of loans, there were borrowers who reported that they had limited their educational expenditures because of concern over debt.[13] As indicated in Table 2, 40% said they avoided more expensive schools because of

concern over borrowing. Of the respondents who did not complete the last degree they began, 41% think that debts were important in influencing their decision to leave school. Of the 77% of our respondents who have not attended graduate school, concern over loans played a crucial role in the decisions of 35% not to pursue further higher education.

Table 2

Importance of Concern Over Borrowing in Limiting Access and Choice in Higher Education

The New England Student Loan Survey

How important was concern over borrowing in preventing you from:

	Not at all important	Somewhat important	Important	Very important	Extremely important
Attending a more expensive school	28%	17%	15%	17%	23%
Staying in school[a]	26%	15%	17%	19%	22%
Going to graduate school[b]	42%	12%	11%	15%	20%

[a] Percentages are based on the 15% of respondents who did not stay in school to complete the last degree they began.

[b] Percentages are based on the 77% of respondents who did not attend graduate school.

Source: Computations by the authors from the New England Student Loan Survey

---

Borrowers from low-income families were more likely than those from higher-income families to have been hesitant to borrow additional funds to attend more expensive schools. Thus, lower-income students, who believe that their attendance at a postsecondary institution was most dependent on the availability of loans, were also most likely to have been concerned about the debt they were accumulating.

The general impression left by these results is that the majority of borrowers believe that student loans expanded their educational options. They are, however, conscious of their future obligations, and their educational decisions are influenced by concern over these obligations. Both availability of loans and concern over borrowing are important factors in the educational decisions of students from low-income family backgrounds. It is clear that the survey respondents believe that the Guaranteed Student Loan program is increasing their educational opportunities but it is certainly not eliminating their concern over financing their educations.

Subjective Impressions of the Burden of Loan Repayment

The survey included several questions designed to elicit subjective impressions of the burden created by loan repayment. Based on the responses, we estimate that approximately 30% perceive significant hardship resulting from their loan repayment. About one-half of the respondents do not perceive measurable hardship.

Our first "burden" question asked respondents to react to the statement, "Since leaving school, my student loans have caused me more financial hardship than I had anticipated at the time I took out the loans." Slightly more than one-quarter of the sample agreed, indicating a perception of hardship. Another quarter gave a neutral response and 50% disagreed. The breakdown of responses to a second statement, "I did not fully appreciate how much total debt I was accumulating when I signed for my student loans," was similar. Responses to these questions are reported in Table 3.

Table 3

Perceptions of Loan Burden

The New England Student Loan Survey

To what extent do you agree or disagree with the following statements regarding your student loans?

	Strongly agree 1	2	3	4	Strongly disagree 5
1. Since leaving school, my student loans have caused me more financial hardship than I had anticipated at the time I took out the loans.	14%	13%	23%	24%	27%
2. I did not fully appreciate how much total debt I was accumulating when I signed for my student loans.	14%	18%	18%	21%	28%
3. Making loan payments is unpleasant but I know that the benefits of the student loans are worth it.	37%	31%	19%	8%	6%
4. My monthly student loan payments are not a significant part of my monthly expenditures.	17%	15%	20%	23%	25%
5. Because of my student loan debt, I changed my career plans.	5%	6%	10%	18%	60%

Note: On questions 1, 2 and 5, a response of ('1 ') indicates greatest hardship, and ('5') indicates minimal hardship. On questions 3 and 4, low-numbered responses indicate greater hardship.

Source: Computations by authors from the New England Student Loan Survey

Some of the questions measuring perceived hardship were posed from a more positive perspective. A large number - 68% - agreed that "Making loan payments is unpleasant but I know that the benefits of the student loans are worth it." Respondents were also asked to agree or disagree with the statement, "My monthly student loan payments are not a significant part of my monthly expenditures." Over 32% agreed with this statement and another 20% gave a neutral response. These responses are consistent with a conclusion that about one-half of the respondents feel little burden from their loan repayment.

There has been considerable speculation about the impact of student debt on career choice, but little reliable evidence is available. The concern is that loan obligations will deter students from selecting professions which offer relatively low salaries. In our sample, only 11% said their loan obligations had affected their career decisions. Over three-quarters of the respondents said they had definitely not changed their career plans because of loans and 10% gave a neutral response (Table 3). These results suggest that fears about the negative impact of existing debt levels on career choice may be misplaced.

Another set of questions asked respondents to assess the importance of loan repayment in delaying a variety of activities typically undertaken by those who have recently left school. We asked only about major decisions including the purchase of homes and cars, as well as moving away from parents, getting married and having children. Depending on the activity, between 60 and 80 percent reported no delays due to loan repayment.

The decision borrowers feel has been most affected by loan obligations is the purchase of a home. This finding is not surprising, since existing debts are a critical part of the determination of mortgage eligibility. The mortgage decision is tightly controlled by lenders and directly linked to pre-existing debt obligations.[14]

As indicated in Table 4, 23% of the respondents said loans had been very important or extremely important in postponing their decision to buy a house. Loan payments are perceived as slightly less important in delaying the decision to buy a car, with 17% of the respondents rating loan obligations crucial in this decision. In contrast, loan repayment caused a delay in getting married for only 9%, in having children for 12%, and in moving out of their parents' home for 13%.

Table 4

Perceptions of the Role of Loan Repayment in Delaying Major Socioeconomic Decisions

The New England Student Loan Survey

How important have your student loans been in causing you to delay any of the following?

	Not at all important	Somewhat important	Important	Very important	Extremely important
Moving out of your parents' home	59%	17%	11%	7%	6%
Purchasing your own home	44%	18%	14%	10%	13%
Purchasing your own car	44%	25%	15%	10%	7%
Getting married	74%	11%	7%	5%	4%
Having children	71%	10%	7%	6%	6%

Source: Computations by the authors from the New England Student Loan Survey.

A final question which gives some insight into how borrowers feel their lives are being affected by their loan payments is one asking how they would spend the additional money they would have if they did not have student loan payments to make. Respondents were asked to check as many of the following categories as applied: housing/utilities, car/transportation, clothing, food, savings, entertainment/vacations, insurance, and other. We assume that those who think they would use all of their (hypothetical) extra money for entertainment/vacations or for savings are not being forced to seriously curtail their standard of living because of loan payments.

The most commonly given answer was "savings", which was checked by 74% of the respondents; 42% of the sample said they would spend more on housing and 30% would increase expenditures on transportation. Savings was the only response given by 25% of the borrowers. Another 6% marked entertainment/vacations only or marked both savings and entertainment/ vacation, but none of the other choices. These 31% of the respondents are probably not among those experiencing significant hardship as a result of their loan payments.

All of these results become more meaningful it we can determine which borrower characteristics independently influence these perceptions of hardship. Multivariate analyses indicate that loan payment size is a significant determinant of feelings of hardship. Payment level was the single most important variable determining responses to the question of whether payments are causing more hardship than borrowers had anticipated (question 1 in Table 3). In addition, borrowers with low current household income are more likely than others to perceive hardship.[15]

These results (among others) lead us to the unsurprising conclusion that the borrowers who feel that their loan payments are a burden to them are likely to be those with high monthly payments and low current income. The

question of whether actual economic behavior is affected in important ways is investigated in the next section.

To summarize, it appears that for about half of the survey respondents, loan payments, while they may not be pleasant, are manageable. But a significant minority -- approximately 30% -- consider themselves unduly burdened as a result of having borrowed to finance their educations. Our evidence suggests that if average cumulative debt levels rise in the coming years (and monthly payments rise with them), then perceptions of burden among repayers can be expected to rise commensurately.

The Impact of Loan Payments on Consumption Patterns

It is inevitable that people paying off loans will feel that they are making some sacrifice in terms of current savings or consumption. Thus, it is not surprising that some portion of the survey respondents expressed the feeling that their loan payments cause them hardship. But perceptions may not be consistent with important economic and lifestyle decisions.

The core of our research on the relationship between loan repayment and actual economic behavior is the analysis of the determinants of home ownership, car ownership and living apart from parents. If payment levels are creating heavy burdens for the respondents, those with high payments should be less likely to own homes, less likely to own cars (especially new cars), and they should be less likely to live apart from their parents.

But the survey responses indicate that high monthly payments do not have any significant impact on the actual consumption patterns of borrowers. In other words, perceptions of burdensome loan payments are not accompanied by any measurable changes in economic behavior. [16] The most important predictors of home ownership, holding other variables constant, are current income category and asset levels. Years of experience in the labor market, as measured by "number of payments made," is also a significant determinant. But

payment levels are not correlated with the home buying decision. Results of other multivariate analyses of the determinants of car (and new car) ownership yield similar results. Payment levels are not correlated with car buying behavior either.

We also analyzed the decision to live apart from one's parents, excluding those who own their own homes from the analysis. The most important variable here is marital status. Those who are married are very unlikely to remain in their parent's homes. Age is also important, with older people less likely to live with their parents than younger people. Income and asset levels are again significant variables and, again, payment levels are not.

There is a common thread running through these multivariate results. The important variables in determining the probability of owning a home or a car, or living away from parents are those which one would intuitively assume might be important in these decisions in the absence of any student loan obligations.

Even though a considerable number of respondents describe themselves as being burdened by the loan payments, there is no evidence that their consumption patterns are different from comparable individuals with smaller loan payments.

Summary and Conclusions

Borrowers responding to the New England Student Loan Survey believe that student loans increased their access to and choice among postsecondary institutions. Almost 70% said the availability of loans was very or extremely important in allowing them to continue their education after high school. About 55% said the loans were crucial in allowing them to enroll in the particular institution they attended. A similar majority of borrowers feel that the availability of loans allowed them to stay in school to complete their degrees.

Individuals from low-income family backgrounds are more likely than high-income respondents to believe that their access to higher education and choice among institutions was enhanced by the availability of loans. The low-income respondents are also, however, more likely to report that concern over accumulating debt prevented them from attending more expensive schools or caused them to devote fewer years to their education than they otherwise would have.

According to the several measures of burden used, approximately 30% of borrowers feel significantly burdened by their loans. On the other hand, about half of the respondents reported that they experience little or no hardship in connection with their student loan payments. With other factors held constant, higher monthly loan payments increase the degree of hardship borrowers attribute to their student loan obligations.

But there appears to be a gap between borrowers' subjective perceptions of burden and the objective impact of loan payments on their economic behavior. When other variables are held constant, monthly loan payments do not have a significant impact on whether or not respondents own a house or a car, or whether they have moved out of their parents' homes.

Many of the borrowers surveyed are carrying average debts and making average monthly payments which, by existing standards, might be expected to be "unmanageable." The evidence strongly suggests, however, that loan payments are not significantly affecting the ability of repayers to enjoy the consumption patterns typical of similar borrowers without high loan payments.[17]

These results must be interpreted with caution. In addition to being geographically and demographically specific to Massachusetts, the sample includes only individuals who participated in loan programs. Thus, those with high debt levels can be compared to those who borrowed less, but not to those who did not borrow at all. The survey also provides no insight concerning those who have chosen not to attend college.

Because of the influence of the size of monthly payments on perceptions of hardship, these feelings can be expected to increase somewhat over time if loan payments grow in relation to borrower earnings. The potential burden of student loans must, however, be weighed against the benefits of loans perceived by a large majority of borrowers, particularly those from low-income family backgrounds. The student loan program appears to be succeeding in its goal of increasing access and choice in higher education for lower and middle-income students. Still, 40% of our survey respondents believe that their choices among institutions of higher education were limited by their concern over borrowing.

In sum, the results indicate that the current public concern over student debt is rooted in the reality of a sizeable number of graduates who feel unduly burdened by their debts. But the hardship perceived by most of these borrowers is not reflected in their consumption patterns, nor is the burden felt universally.

Notes

1. Historically, there have been several types of subsidized loans to postsecondary students. The Guaranteed Student Loan program, established in 1966, now dominates all other loan programs, both in number of recipients and in dollar volume.

2. These levels of indebtedness were calculated by Hansen (1985) and reflect her estimate of loan levels from all loan programs.

3. Several previous studies have examined the relationship between loan repayment and borrowers' attitudes and behavior. Most notably, Boyd and Martin (1985) found that loan repayment did not impose a heavy burden on borrowers. The respondents in their study had lower debt levels than the respondents in the current study. The earlier study found an average educational debt of about $6,400 and average monthly repayments of about $80. Borrowers who paid more than $100 per month were significantly more likely than others to feel burdened by their loan payments.

4. The results presented here are based on 1,318 completed surveys or 70% of the 1,875 individuals to whom surveys were successfully delivered. This response rate is extremely high relative to response rates achieved on previous financial aid surveys. In the analysis below, the survey responses were combined with some of the information available from the MHEAC records.

5. Our sample was drawn from the subset of those in the MHEAC/Nellie Mae population who did not claim independent status and who last applied for a GSL during or after 1982. Several other restrictions were placed on the population. See the complete report (Baum and Schwartz, 1988) for details.

6. The reported average includes all borrowers, regardless of how many years they attended school; the estimate by Hansen reported above included only those who had completed four-year undergraduate programs.

7. Previous studies have estimated "manageable" debt levels based on the proportion of starting incomes which can reasonably be devoted to repayment. See Daniere (1969), Hartman (1971), and Horch (1978, 1984). The consensus of this literature is that students graduating from college in the mid-1980's can be expected to successfully manage debts up to between $5,000 and $8,000. Beyond these levels, debts are thought to cause unreasonable burdens.

8. These debt level and payment level averages do not include the debts and payments of spouses or unmarried partners. Combined debt and payment levels are often considerably higher.

9. The source for these comparisons is U.S. Department of Commerce (1984).

10. Descriptions by survey respondents of their attitudes and preferences are notoriously difficult to interpret. Feelings one individual describes as "hardship" might be labelled "slight inconvenience" by another. For this reason, it is difficult to draw any definitive conclusions from responses to questions which ask respondents to evaluate their circumstances subjectively.

11. All correlations between variables are based on multivariate analyses and thus represent correlations remaining after accounting for the effects of all other variables. For complete specification and results of these multivariate analyses see Baum and Schwartz (1988).

12. This variable was taken from existing MHEAC data; it represents the family income reported on the GSL application. Nominal family income reported was converted to 1987 dollars.

13. Some potential students may not continue their education after high school because of their reluctance to borrow. Since our population includes only those who have already chosen to borrow, we cannot estimate the impact of this concern over debt on access to higher education.

14. It should be noted that the average price of a home in Massachusetts is very high by national standards.

15. The determinants of how respondents feel about the significance of loan payments as a part of monthly expenditures (question 4 in Table 3) are similar. Again, the size of loan payments, asset levels and current household income were important.

16. Because we could not ask detailed questions on a mail survey, we have only limited data on consumption patterns. If more detailed consumption data were available (for example, what other major consumer goods are owned by respondents or what their specific housing costs are), we would be able to examine the impact of loan repayment on the standard of living of borrowers more thoroughly. In particular, we would be able to test our implicit finding of a zero income elasticity for homes, cars and living arrangements within an income category.

17. The finding of no <u>average</u> correlation between payment levels and economic behavior does not, of course, imply that no individuals are suffering. We received a great number of written comments on the survey forms, some of which told stories of great hardship which respondents attribute to student loans.

References

American Council on Education (1985). "Fact Sheet: Student Borrowing Has Implications for Career Choice." Washington, D.C.: American Council on Education.

Baum, Sandy and Schwartz, Saul (1988). "Final Report of the New England Student Loan Survey." Boston, Massachusetts: Unpublished

Boyd, Joseph and Martin, Dennis (1985). "The Characteristics of GSL Borrowers and the Impact of Educational Debt." Washington, D.C.: National Association of Student Financial Aid Administrators.

Consortium on Financing Higher Education (COFHE) (1987). Survey of Student Loan Borrowers. Xerox obtained from Larry Litton.

Daniere, Andre (1969). "The Benefits and Costs of Alternative Federal Programs of Financial Aid to College Students" in The Economics and Financing of Higher Education in the United States. A Compendium of Papers Submitted to the Joint Economic Committee. Washington, D.C.

Davis, Jerry (1975). "GSL Borrower Characteristics" NASSGP/NCHELP Conference Proceedings.

Dillman, Donald (1978). Mail and Telephone Surveys. New York: John Wiley and Sons.

Ehlenfeldt, Lisa and Springfield, Donna (1984). Study of Guaranteed Student Loan Defaults, Richmond: Virginia Education Loan Authority.

Hansen, Janet (1987). "Student Loans: Are They Overburdening a Generation?" Washington, D.C.: The College Board.

Hartman, Robert (1971). Credit for College. New York: McGraw-Hill

Hauptman, Arthur (1977). "Student Loan Defaults: Towards a Better Understanding of the Problem," in Lois D. Rice, ed. Student Loans: Problems and Policy Altermatives. New York: College Entrance Examination Board.

_____ (1983). "Student Loan Default Rates in Perspective." American Council on Education Policy Brief, 1983.

Horch, Dwight (1978). "Estimating Manageable Educational Loan Limits for Graduate and Professional Students. Princeton: Educational Testing Service.

_____ (1985). "Student Loan Limits: Estimated Manageable Student Loan Limits for the Class Graduating in 1984 and the Class Entering in 1988." Princeton: Graduate and Professional School Financial Aid Service.

_____ (1986) "Determining Student Capacity to Borrow." in Proceedings of the College Scholarship Service Colloquium on Student Loan Counseling and Debt Management, Xerox, College Entrance Examination Board.

Johnson, Robert W. and Sullivan, Charlene (1983). "The Role of Education Debt in Consumers' Total Debt Structure." Krannert Graduate School of Management - Purdue University, Credit Research Center, Working Paper No. 45.

Kramer, Martin and Van Dusen, William (1986). "Living on Credit." Change, May/June, pp. 10-19.

Marchese, Theodore (1986). "Fulfilling the Institution's Responsibilities to Student Borrowers," in Proceedings of the College Scholarship Service Colloquium on Student Loan Counseling and Debt Management, Xerox, CEEB.

Mohrman, Kathryn (1987). Unintended Consequences of Federal Student Aid Policies." The Brookings Review. Fall, pp. 24-30.

U.S. Department of Commerce, Bureau of the Census. Statistical Abstract of the United States, 1984. Washington, D.C. : U.S. Government Printing Office, 1984.

Wilms, Wellford; Moore, Richard; and Bolus, Roger (1987). "Whose Fault is Default? A Study of the Impact of Student Characteristics and Institutional Practices on Guaranteed Student Loan Default Rates in California." Educational Evaluation and Policy Analysis. 9 (1): pp.41-54.

Wolfe, Mark, Osman, David, and Miller, Vic (1987). "Report of Federal Guaranteed Student Loan Default Rates By Institutions of Postsecondary Education: Preliminary Filndings." Xerox. Washington, D.C.: Federal Funds Information for States.